

Claims

1. A method for a base site to provide a dispatch patch service to a communication unit in a CDMA communication system, the method comprising the steps of:
 - 5 encoding dispatch communication for a dispatch call using a first CDMA long-code mask;
 - receiving a request to patch a dispatch target into the dispatch call from the communication unit, wherein, prior to the step of receiving, the dispatch call does not involve the dispatch target and the first CDMA long-code mask is used for encoding dispatch communication for the dispatch call; and
 - 10 transmitting a channel assignment to the dispatch target that indicates the first CDMA long-code mask.
- 15 2. The method of claim 1 further comprising the steps of:
 - transmitting CDMA long-code mask update information to the communication unit;
 - generating a second CDMA long-code mask using the first CDMA long-code mask and a dispatch identifier of the dispatch target;
 - 20 and
 - encoding dispatch communication for the dispatch call using the second CDMA long-code mask.
- 25 3. The method of claim 1 further comprising the step of transmitting a dispatch page to the dispatch target.
4. The method of claim 2 wherein the dispatch call is a group dispatch call.
- 30 5. The method of claim 2 wherein the dispatch call is an individual dispatch call.

6. The method of claim 2 wherein the dispatch target is a dispatch group.

7. The method of claim 2 wherein the dispatch target is a dispatch individual.

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8. The method of claim 2 wherein the dispatch identifier of the dispatch target comprises a dispatch group identifier of the dispatch group associated with the dispatch target.

10 9. The method of claim 2 wherein the dispatch identifier of the dispatch target comprises a dispatch individual identifier of the dispatch target.

10. The method of claim 2 wherein the channel assignment indicates a traffic channel associated with the dispatch call prior to the step of receiving.

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11. A method for a communication unit to invoke a dispatch patch service from a base site in a CDMA communication system, the method comprising the steps of:

decoding, by the communication unit, dispatch communication for a
5 dispatch call using a CDMA long-code mask;
transmitting, by the communication unit, a request to patch a dispatch
target into the dispatch call, wherein the dispatch call does not
involve the dispatch target prior to the step of transmitting;
receiving, by the communication unit, CDMA long-code mask update
10 information; and
decoding, by the communication unit subsequent to the step of
transmitting, dispatch communication for the dispatch call using
an updated CDMA long-code mask, wherein the dispatch call
involves at least the communication unit and the dispatch
15 target.

12. The method of claim 11 wherein the CDMA long-code mask update information is the updated CDMA long-code mask.

20 13. The method of claim 11 further comprising the step of updating the CDMA long-code mask using the CDMA long-code mask update information to produce the updated CDMA long-code mask.

25 14. The method of claim 13 wherein the CDMA long-code mask update information comprises a dispatch identifier of the dispatch target.

15. The method of claim 11 further comprising the step of receiving, by the communication unit, information about the dispatch target.

16. A method for a communication unit to be patched into a dispatch call in a CDMA communication system, the method comprising the steps of:

receiving, by the communication unit, a dispatch page for the dispatch call;

5 receiving, by the communication unit, a channel assignment that indicates a first CDMA long-code mask used for the dispatch call prior to the step of receiving the dispatch page;

10 generating, by the communication unit, a second CDMA long-code mask using the first CDMA long-code mask and a dispatch identifier of the communication unit; and

decoding, by the communication unit, dispatch communication for the dispatch call using the second CDMA long-code mask.

17. The method of claim 16 wherein the dispatch identifier of the communication unit comprises a dispatch group identifier of the dispatch group associated with the communication unit.

18. The method of claim 16 wherein the dispatch identifier of the communication unit comprises a dispatch individual identifier of the communication unit.

19. A base site comprising:
- a processor capable of encoding dispatch communication for a dispatch call using a first CDMA long-code mask;
 - a receiver capable of receiving a request to patch a dispatch target into the dispatch call from a communication unit, wherein, prior to the receiver receiving the request, the dispatch call does not involve the dispatch target and the first CDMA long-code mask is used for encoding dispatch communication for the dispatch call; and
- 5 10
- a transmitter capable of transmitting, when instructed to transmit by the processor, a channel assignment to the dispatch target that indicates the first CDMA long-code mask.
20. The base site of claim 19 wherein the transmitter is further capable of transmitting CDMA long-code mask update information to the communication unit when instructed to by the processor and wherein the processor is further capable of generating a second CDMA long-code mask using the first CDMA long-code mask and a dispatch identifier of the dispatch target and capable of encoding dispatch communication for the dispatch call using the second 15
20 CDMA long-code mask.

21. A communication unit comprising:
- 5 a processor capable of decoding dispatch communication for a dispatch call using a CDMA long-code mask, capable of instructing the transmitter to transmit a request to patch a dispatch target into the dispatch call, wherein the dispatch call does not involve the dispatch target prior to instructing the transmitter to transmit the request to patch, and capable of decoding, subsequent to instructing the transmitter to transmit the request to patch, dispatch communication for the dispatch call using an updated CDMA long-code mask for the dispatch call, wherein the dispatch call involves at least the communication unit and the dispatch target;
- 10 a transmitter capable of transmitting the request to patch; and
- 15 a receiver capable of receiving CDMA long-code mask update information used to generate the updated CDMA long-code mask.

22. A communication unit comprising:

 - a receiver capable of receiving a dispatch page for a dispatch call and a channel assignment that indicates a first CDMA long-code mask used for the dispatch call; and
 - a processor capable of generating a second CDMA long-code mask using the first CDMA long-code mask and a dispatch identifier of the communication unit and capable of decoding dispatch communication for the dispatch call using the second CDMA long-code mask.

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